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From Archaeology to Genealogy: Adding Processes of Subjectivation and Artistic Intervention

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Abstract

This article further develops a methodological approach to media genealogy that extends the methods of media archaeology by adding the concept of processes of subjectivation and experimental and artistic interventions. This begins with an analysis of how the work of scholars such as Foucault, Stiegler, and Kittler aligns with media archaeology practices in terms of discourse networks. Next, I consider how Foucault's lectures from the Collège de France can be used to extend current media archaeology practices into a genealogical method. After surveying how recent work in several disciplines might match up with such a genealogical approach, the work of Gilles Deleuze, Félix Guattari, and Anne Sauvagnargues is used to develop a genealogical method that emphasizes experimental processes of subjectivation.

Keywords

media archaeology, media genealogy, processes of subjectivation, artmachines, Foucault

Introduction

While media archaeology emerged primarily out of the work of early Foucauldian frameworks and methods, it has not been fully reconciled with the genealogical approaches of his later lectures from the Collège de France beginning in 1970. While some scholars have begun to call for such an approach, this work has primarily focused on analyzing the ways in which previous scholarship happens to align with some of the frameworks of a media genealogy methodology.[1] Following and then extending this work, my paper argues for a methodological approach to media genealogy that emphasizes the importance of processes of subjectivation, which requires studying the larger context of the technology as well as the histories of which it is a part. The process of subjectivation is driven by the "relationships of power" or "field of forces" within which a subject exists and constitutes itself. The concept of media used here is meant to apply broadly. Alexander Monea and Jeremy Packer define media as "tools of governance that shape knowledge and produce and sustain power relations while simultaneously forming their attendant subjects."[2] Such a definition allows for a media genealogy approach to be applied to a wide variety of technologies beyond those more traditionally considered to be a medium.

Media genealogy does not replace, but rather extends the methods of media archaeology in ways that make clearer the intersections of media studies with broader fields such as science, technology, philosophy, and even art. One question that remains unanswered about the epistemic shifts analyzed through media archaeology is how one might intervene in the role that technology plays in shaping us as subjects. For example, Stiegler shows how one can examine the impact of a specific medium, such as cinema, on how we understand the world, following Kittler's emphasis on a presupposition of mediality and media specificity.[3] However, of note, Jussi Parikka calls attention to the fact that often the work that emphasizes political analysis and the work that emphasizes media specificity are mutually exclusive.[4] In the case of Stiegler's *Technics and Time* series, there is only brief mention of cognitive capitalism and how it might relate to his ontological and epistemological theory. For example, he refers to Hollywood as the capital of industrial schematism as a means of a brief transition into a larger discussion about the political economy of consciousness, but the cinematic form of consciousness that he aims to develop is done so without the

[1] Monea, Alexander, and Jeremy Packer. 2016. "Media Genealogy and the Politics of Archaeology." *International Journal of Communication* 10: 3141–59.

[2] Ibid. 3152.

[3] Stiegler, Bernard. 2011. *Technics and Time, 3: Cinematic Time and the Question of Malaise.* Translated by Stephen Francis Barker. Meridian, Crossing Aesthetics. Stanford, Calif: Stanford University Press.

[4] Parikka, Jussi. 2012. *What Is Media Archaeology?* Cambridge: Polity Press.

larger context of the cognitive capitalism of Hollywood.[5]

In contrast, I argue that politics are inherently intertwined with these approaches. Most importantly, the genealogical emphasis on processes of subjectivation allows for the emergence of art as a form of *technē* that more fully opens up experimental approaches to one's own processes of subjectivation in their current milieu. Conceptually, this practice bridges Foucault's later genealogical work with Gilles Deleuze's and Félix Guattari's work on processes of subjectivation. In particular, for Guattari, machines are the conceptual operators of the assemblage.[6] The methods developed in this article will consist of first understanding how the machine operates as it constructs subjects by drawing on the genealogical tools of Foucault and then taking the next step of actively intervening in those processes through an aesthetic-ethical form of experimentation that Anne Sauvagnargues calls an artmachine.[7] This openness to radical experimentation through the artmachine is a risky political act that intentionally echoes Baruch Spinoza's ethical imperative to ask what a body can do.[8] Such experimentation opens wide the aesthetic paradigm that makes clear the uncertain and always metastable state of the assemblages which surround us and also create us. For this reason, the aesthetic emphasis on experimentation is of utmost importance for generating new processes of subjectivation.

By moving from archaeology to genealogy, one's research methods become inextricably entangled in the intersections of not only critical cultural communication and media studies, but also science, philosophy, and art. By embracing a method of analysis and experimentation through processes of subjectivation, media genealogy can engage in increasingly broader discussions about the impact of media both on how we understand the world and are constructed as subjects within that world.

Media Archaeology and Discourse Networks

In this section, I will show how the works of Foucault, Kittler, and Stiegler participate in media archaeological methods that highlight discourse networks. After analyzing the way that such work follows current media archaeological practices, I will consider in the next section how this can be extended through Foucault's genealogical methods in his later work. In *Archaeology of Knowledge*,[9] Foucault attempts to explicitly lay out

[5] Stiegler, *Technics and Time, 3,* 37-38.

[6] Sauvagnargues, Anne. 2016. *Artmachines: Deleuze, Guattari, Simondon.* Translated by Suzanne Verderber and Eugene W. Holland. Edinburgh: Edinburgh University Press.

[7] Ibid.

[8] Spinoza, Baruch. 1994. *Ethics: Treatise on the Emendation of the Intellect and Selected Letters.*

[9] Foucault, Michel. 2002. *The Archaeology of Knowledge.* New York, NY: Pantheon Books.

a method that was used imperfectly in his earlier works such as *Madness and Civilization*[10] and *The Order of Things*.[11] He defines his archaeological method as the process of uncovering the conditions of knowledge as they take shape in discourse. Before this method, language analysis focused on which particular rules allowed statements to be made. Foucault's description of the events of discourses asks a much different question: "how is it that one particular statement appeared rather than another?"[12]

The emphasis in this method is on discourse itself, which entails examining statements as real and manifestly present, considering only what has been formulated, which importantly, also includes those things that have been left out as gaps in what is said.[13] These are disconnected from any individual subject, or transcendental/collective consciousness. In other words, statements must be taken at face value rather than endeavoring to search for any authorial intent that might exist behind such statements. This method focuses on knowledge in that it explores the relation between discursive practice and knowledge, or *savoir*, in the original French. *Savoir*, in contrast to *connaissance*, refers to "the conditions that are necessary in a particular period for this or that type of object to be given to *connaissance* [relation of the subject to the object] and for this or that enunciation to be formulated."[14] It explores the conditions that make it possible to utter a particular statement in the first place. These conditions are the dynamic set of relations that make up the archive, which is the law of what can be said. One limitation of this method is that it is impossible to describe one's own contemporary archive precisely because of one's location within it as a limiting factor of what can be seen and said.

Foucault lays out three guidelines for analyzing the rules of formation of objects: (1) the surfaces of emergence, or the context in which the object is situated, (2) the authorities of delimitation, and (3) the grids of specification, or the systems by which an object is structured and differentiated.[15] Further, this leads to four consequences: (1) objects do not pre-exist their emergence, (2) object is defined by exterior relations with other objects in a field of exteriority, (3) relations must be

[10] Foucault, Michel. 1988. *Madness and Civilization: A History of Insanity in the Age of Reason*. Vintage Books Ed., Nov. 1988. New York: Random House.

[11] Foucault, Michel. 1994. *The Order of Things: An Archaeology of the Human Sciences*. Vintage books edition. New York NY: Vintage Books.

[12] Foucault, Michel. 2010. *The Government of Self and Others: Lecture at the Collège de France 1982-1983*. Edited by Frédéric Gros. Translated by Graham Burchell. New York: Macmillan. 30.

[13] Deleuze, Gilles. 1988. *Foucault*. Translated by Seán Hand. Minneapolis: University of Minnesota Press. 3.

[14] Translator's reference, original source not given in Foucault, *The Archaeology of Knowledge*.

[15] Ibid. 44-54.

distinguished by primary relations, and (4) discursive relations take place at the limit of discourse, determining the group of relations necessary to speak of any particular object.

The set of relations between a discursive formation and the sciences is called an episteme: "the total set of relations that unite, at a given period, the discursive practices that give rise to epistemological figures, sciences, and possibly formalized systems."[16] Foucault then considers potential wider applications of his archaeological method, moving beyond analyses of epistemes. One example he offers is how this method might be used with a painting. Rather than the more traditional focus on the meaning of a painting, an archaeological approach would try to show the discursive practices that have been embodied in the techniques and gestures of the painter.

Yet, Foucault's analyses are limited in an important way. According to Kittler, Foucault's analyses all focused on discourse networks that consisted of libraries.[17] However, discourse networks consist of more than just libraries, especially beginning with what Kittler referred to as the 1900 discourse network. This is offered as one potential reason that Foucault's own historical research did not extend past 1850. In *Gramophone, Film, Typewriter*, Kittler points out that Foucault was not able to see that even writing itself is a technology, and in fact served as universal medium before the concept of a medium existed.[18] An important project for Kittler then, was expanding Foucault's methods into discourse networks that include other forms of media such as information networks: "Archaeologies of the present must also take into account data storage, transmission, and calculation in technical media."[19] Geoffrey Winthrop-Young argues that, whereas for Foucault epistemes shifted inexplicably, Kittler demonstrates how such epistemic shifts are correlated with shifts in media by exploring the ways that power circulates through the hardware and software that makes up technical media systems, through his insistence on the presupposition of exteriority, mediality, and corporeality.[20] Deleuze and Guattari's exploration of postsignifying semiotics adds an additional complexity by demonstrating that

[16] Ibid. 211.

[17] Kittler, Friedrich A. 1990. *Discourse Networks 1800/1900*. Stanford, Calif: Stanford University Press.

[18] See Kittler, Friedrich. 1999. *Gramophone, Film, Typewriter*. Writing Science. Stanford, Calif: Stanford University Press. Though Foucault did not analyze print as a technology, the enormous role of print culture in cultural, political, and economic structures has been argued by scholars such as Eisenstein (2009) and Johns (1998).

[19] Kittler, *Discourse Networks 1800/1900.* 369

[20] Winthrop-Young, Geoffrey. 2011. *Kittler and the Media*. Theory and Media. Cambridge: Polity.

signification is only one way that we can approach reality.[21,22] Technical media are now capable of bypassing human interpretation through their use of postsignifying semiotics.

One question that remains unanswered about epistemic shifts is how we might intervene in the role that technology plays in shaping us as subjects. In *Technics and Time, 3*, Bernard Stiegler makes concrete the degree to which technics impact our forms of knowledge and the way that we see the world through our ēpistēmē.[23] The invention of analog sound recording allowed humans, for the first time ever, to experience exactly the same thing twice. For Stiegler, what this demonstrates is precisely that each experience, though it may be of the exact same audio, is really a different experience, because we bring to it new anticipations based on our having heard it before. This elucidates the way that technical objects serve as a tertiary memory that consists of our heritage and background knowledge, and actually serves as the foundation for primary and secondary memory.[24] These technical systems create epochs, and when we transition to an epoch because of a new technical system, we likewise face a disruption that must be negotiated using the technical object itself. This notion echoes Kittler's analysis of epistemic shifts that are correlated with shifts in media.

However, for Stiegler, cinematography plays a unique role in that he sees it as mimicking the way that consciousness itself works, through their similar processes of editing by joining experiences into a single flow using montage. This similarity also explains the persuasive power of cinematography. Due to the aforementioned industrialization of this tertiary memory, Stiegler argues that the process of the collective individuation of a 'We' is stifled, creating existential suffering, or malaise.[25] Although this process itself is industrialized, Stiegler does point to it as an area for potential resistance, allowing the possibility that we might ourselves be able to determine what counts as our heritage through the process of crafting a future.

The arguments presented in these three works serve as a fundamental example of the type of work that the field of media archaeology can undertake. First, they emphasize one of the key themes of media archaeology, which seeks to understand what it means to be modern and to be in the world, with special emphasis on the

[21] Gilles Deleuze and Félix Guattari. 1987. *A Thousand Plateaus: Capitalism and Schizophrenia.* Minneapolis: University of Minnesota Press.

[22] Félix Guattari. 1977. *Molecular Revolution: Psychiatry and Politics*, Peregrine Books Harmondsworth, Middlesex, England; New York, N.Y., U.S.A: Penguin.

[23] Stiegler, *Technics and Time, 3.*

[24] Stiegler, Bernard. 2009. *Technics and Time 2: Disorientation.* Stanford, Calif: Stanford Univ. Press.

[25] Stiegler, *Technics and Time, 3,* 93-103.

media experiences of the nineteenth and early twentieth centuries.[26] Moving beyond merely analyzing how media shape our ēpistēmē, Stiegler argues that technics are a fundamental ontological part of the human experience and that, in actuality, the human experience has always already been caught up in and is inseparable from technics. This takes seriously Foucault's claim that the archive constructs what is seeable and sayable, while at the same time adding technics inextricably to the perceptual apparatus. Through an emphasis on epochs generated by specific technical objects and systems, Stiegler also offers an example of how media archaeology can examine the impact of specific media on how we understand the world, following Kittler's emphasis on a presupposition of mediality and media specificity. For example, though cinematography holds a special position because of its similarity with consciousness, cinema has also converged with digital media and is being shaped, altered, and moved beyond in ways that are important to consider. Specifically, the impact of networks as a technical epoch brings with it new challenges to the way that we understand time and memory.

Stiegler's work, also drawing at times on Simondonian concepts such as individuation, gives a concrete example of how Félix Guattari understands the role of semiotic layers in his machinic regime. What is seeable and sayable is limited because we are constructed as subjects by and through the technics that are inextricably linked to our perceptual apparatus – we are shaped within the confines of the semiotic layers in which we individuate. However, whereas Stiegler notes some possibility for the crafting of our own future, Guattari identifies a radical openness to experimentation. This experimentation is also inherently political for Guattari, as we experiment to move away from empire and capitalist regimes of subjectivation.[27] The question remains, then, how does one study these processes of subjectivation as a way to better experiment with them?

Process of Subjectivation in the Collège de France Lectures

In developing this shift from media archaeology to media genealogy, it is important to understand not only Foucault's genealogical methods, but the way that he theorizes the concept of technology in his work. Foucault uses the concept of technology quite

[26] Parikka, *What is Media Archaeology?*

[27] Though it is beyond the scope of this paper, it is worth noting that this work adheres to Maurizo Lazzarato's argument in *Signs and Machines* that capital plays a significant role in processes of subjectivation. Further, the media genealogy methods explored herein can and ought to be used to further explore the relationship between capital and processes of subjectivation, while at the same time experimenting with alternative processes.

broadly, as seen through the lens of contemporary philosophy of technology.[28] This perspective conceives of technology as something that can be "associated with diverse human behaviors, with distinctions among them often less clear than for either artifacts or cognitions. Technological activities inevitably and without easy demarcation also shade from individual or personal into group and institutional forms."[29] This understanding of technology as primarily an activity aligns well with Foucault's own use of the term technology, and also calls back to the term's Greek root and its emphasis on skill. It is through this emphasis on technology that Foucault is able to sidestep both the structuralist and analytic philosophic traditions by focusing instead on a genealogy of the subject as contingent.[30] The link, therefore, between this understanding of technology and the subject as contingent is precisely what allows Foucault's work to move in such different directions from the humanist critique of technology as a corruption of the essence of man, which, as Stiegler[31] acknowledges, would require a clear understanding of what human nature is in the first place. Therefore, Foucault's use of technology is intimately connected with his anti-humanist philosophy, which provides a major foundational thread for postmodernism.

Before further exploring Foucault's conceptualization of technology, it is worth emphasizing that the word 'technique,' also rooted in the Greek *technē,* is used as a very near synonym for technology in French, which is a slightly closer relation than the two words have in English: "in French, the words 'technologie' and 'technique' are used more or less interchangeably to refer to technology, with the latter term being somewhat more general and more often applied to technologies that pre-date industrialization."[32] The connection between these two terms is important for understanding the role of technology across the whole of Foucault's work, because he uses 'technique' more frequently in his early works before he takes up the concepts of technologies of power and self in later work. I have drawn on Michael Behrent's

[28] See Gerrie, Jim. 2003. "Was Foucault a Philosopher of Technology?:" *Techné: Research in Philosophy and Technology* 7 (2): 66–73. doi:10.5840/techne2003722. and Packer, Jeremy. 2012. "The Conditions of Media's Possibility: A Foucauldian Approach to Media History." In *The International Encyclopedia of Media Studies*, by Angharad N. Valdivia. Oxford, UK: Blackwell Publishing Ltd. http://doi.wiley.com/10.1002/9781444361506.wbiems005.

[29] Mitcham, Carl. 1994. *Thinking through Technology: The Path between Engineering and Philosophy*. Chicago: University of Chicago Press. (as quoted in Gerrie 2003)

[30] Foucault, Michel. 1997. *The Essential Works of Foucault, 1954-1984*. Edited by Paul Rabinow. New York: New Press.

[31] Stiegler, Bernard. 1998. *Technics and Time 1: The Fault of Epimetheus*. Meridian. Stanford, Calif: Stanford University Press.

[32] Chabot, Pascal. 2013. *The Philosophy of Simondon: Between Technology and Individuation*. London: Bloomsbury Academic. 22.

article, which traces Foucault's use of the terms technology and technique throughout his oeuvre as a map for this analysis.[33] For example, Behrent is able to point to several instances where Foucault clearly uses these terms interchangeably, such as his 1978 lecture, *La société disciplinaire en crise:* "My research deals with *techniques* of power, with the *technology* of power."[34] Understanding the close connection of these two terms for Foucault allows us to link his later explicit discussions of technology to some of his earlier references to technique.

One important link between this work occurs in *Archaeology of Knowledge.*[35] Although most of this book is devoted to knowledge (*savoir)* in relation to discourse, the end of the work suggests that Foucault's methods can also be expanded to a wider variety of practical discursive practices, of which painting and its related techniques serve as the primary example, as noted above. In other words, techniques/technologies themselves are understood as *savoir*: "In this sense, the painting is not a pure vision that must then be transcribed into the materiality of space; nor is it a naked gesture whose silent and eternally empty meanings must be freed from subsequent interpretations. It is shot through — and independently of scientific knowledge (*connaissance*) and philosophical themes — with the positivity of a knowledge (*savoir*)."[36] Just an afterthought in *Archeology of Knowledge*, this relationship of technology to knowledge opens the door for the much greater role that technology will play in the development of Foucault's tripartite schema of power, knowledge, and subjectivity, harkening back to the Sophistic understanding of *technē* which linked skills, techniques, and art to the formation of a wise subject.[37]

The later lectures at the College of France focus more explicitly on what Foucault outlines as four major types of technologies: production, sign systems, power, and self, which all work together and overlap in various ways to produce an individual.[38] Much of his work in the 1970s related to technologies of power, whereas his work in the 1980s shifted further toward technologies of the self. The technology of power is a form of external domination that objectifies the individual, while the technology of self allows individuals to effect, by their own means, operations on their body. It is the intersection of these particular two technologies, power as an external

[33] Behrent, Michael C. 2013. "Foucault and Technology." *History and Technology* 29 (1): 54–104. doi:10.1080/07341512.2013.780351. Emphasis added.

[34] As quoted in Behrent, 59.

[35] Foucault, *The Archaeology of Knowledge.*

[36] Ibid. 214.

[37] Roochnik, David. 1996. *Of Art and Wisdom: Plato's Understanding of Techne.* Place of publication not identified: Pennsylvania State University.

[38] Foucault, *The Essential Works.*

influence and self as an internal influence, that Foucault defines as governmentality and which plays a constitutive role in the process of subjectivation.

It is in the *Psychiatric Power* lecture that we see Foucault explicitly connecting technology to power: "Discipline seems to me to be this technology, specific to the power that is born and develops from the classical age, and which, on the basis of this game of bodies, isolates and cuts out what I think is an historically new element that we call the individual."[39] Here, Foucault links the technology of discipline to a certain conception of man through its co-construction of the subject with the body, which necessarily asserts the contingent so-called essence of man. This connection to discipline extends in many directions throughout Foucault's work moving forward, from his explicit descriptions of the Panopticon as a technology in *Discipline and Punish*[40] to the power techniques employed by the sexual apparatus in *The History of Sexuality 1: The Will to Knowledge*[41], which both emphasize the ability for technology to be used to constitute and manipulate individuals in ways that are more practical than ideology and subtler than violence.[42]

The shift toward bio-power in the 1978 and 1979 lectures tracks the changing emphasis of power toward security and social control that begins in the eighteenth century. Foucault describes his work as undertaking a history of technologies of security, highlighting in particular the correlation between the techniques of security and population that gave rise to the modern concept of population.[43] This represents the extension of study from the discipline of bodies to regulation of populations and allows him to define man as a figure of population, again emphasizing the contingent status of so-called human nature.

The *Subjectivity and Truth* lectures, which serve as foundation for the *History of Sexuality 3,*[44] explore technologies of the self through the question of how a subject is established by his or her own self-government, or self-care. The techniques of self

[39] Foucault, Michel. 2006. *Psychiatric Power: Lectures at the Collège de France, 1973-74*. Edited by Jacques Lagrange. Translated by Graham Burchell. 1. Picador ed. Lextures at the Collège de France. New York, NY: Picador.

[40] Foucault, Michel. 1995. *Discipline and Punish: The Birth of the Prison*. 2nd Vintage Books ed. New York: Vintage Books.

[41] Foucault, Michel. 1990. *The History of Sexuality Vol. 1: The History of Sexuality*. Vintage Books ed. New York: Vintage Books.

[42] Behrent, "Foucault and Technology," 84.

[43] Foucault, Michel. 2007. *Security, Territory, Population: Lectures at the Collège de France, 1977-78*. Edited by Michel Senellart, François Ewald, and Alessandro Fontana. Basingstoke; New York: Palgrave Macmillan : République Française.

[44] Foucault, Michel. 1986. *The History of Sexuality Vol. 3: The Care of the Self*. Vintage Books ed. New York: Vintage Books.

are explored in these lectures as they relate specifically to sexuality and also serve as a way to understand such techniques as a method for completing a history of subjectivity. *On the Government of the Living*[45] marks a turning point in which Foucault moves away from technologies of power and begins to expand his analysis to technologies of the self, considering the production of subjectivity in Greco-Roman and Christian cultures. Moving beyond even these epochs, Foucault explains that there are a variety of ways that one can examine one's own conscience, which include the nature of the examination, the objective, and the instruments, showing how both the Greco-Romans and Christians used these tools in a unique manner.[46] In other words, although Foucault has in this work focused on some of the particular ways that technologies of the self have been used by Greco-Romans and Christians, many more approaches are possible. Understanding how such technologies are used in an epoch is an important part of understanding the production of subjectivity.

The role of the instrument in the process of examination of conscience and mode of subjectivation offer an opportunity for further exploration. Although Foucault gives the examples of concentration, memory, virtual discourse, confession, and writing for oneself or others, he acknowledges that such a list is not all-inclusive. Through this understanding of particular instruments within the larger framework of technologies of the self, there are potential connections to Stiegler's[47] work on memory and Kittler's[48] exploration of verbalization and writing in German literature.

Throughout these 1980s lectures, Foucault explores these different varieties of subjectivation, which previously had been obscured to him because of his emphasis on the eighteenth- and nineteenth-century production of the subject through knowledge and power. What becomes clear through this extended exploration of subjectivity, and of utmost importance for our understanding of the role of technology in this process, is how large of a role the technologies of the self play in the process of subjectivation. For example, in *Hermeneutics of the Subject*,[49] Foucault links these forms of self-government in antiquity to the way one governs others, creating a broader political impact. The most important problem of our time, he argues, is not freeing individuals from an oppressive State, but rather promoting new forms of subjectivity through experimenting with technologies of the self. This prioritization, of course, links

[45] Foucault, Michel. 2014. *On the Government of the Living: Lectures at the Collège de France, 1979-1980*. Edited by Michel Senellart, François Ewald, and Alessandro Fontana. Translated by Graham Burchell.

[46] Ibid, 236-237.

[47] Stiegler, *Technics and Time, 1.*

[48] Kittler, *Discourse Networks 1800/1900.*

[49] Foucault, Michel. 2005. *The Hermeneutics of the Subject: Lectures at the Collège de France, 1981-1982*. Edited by Frédéric Gros. 1st ed. Lectures at the Collège de France. New York: Picador.

Foucault to the Spinozan emphasis on experimentation[50] in order to determine what a body can do. We cannot know ahead of time what forms of subjectivity will arise through our experiments with technologies of the self before we implement them.

This link becomes clearer in his final two lectures. In *The Government of Self and Others*,[51] Foucault argues that philosophy must not be limited to discourse alone but must put itself to the test of practices. This is explored somewhat abstractly through the concept of pārrhēsia, or the courage of truth, but is made concrete through the example of the Cynics in *The Courage of Truth*[52] lectures the following year. For Foucault, the Cynics offer a rare example of living life as a test, as a form of praxis or aesthetics of existence. In the Cynic's constituting of himself as a spectacle, this is a way to confront other individuals with their own contradictions. In this way, the Cynic's self-care also becomes a care for the world. Experimentation with technologies of the self undergird the entire process of this experimental form of an aesthetics of existence, firmly foregrounding the conceptual importance of technology in the process of subjectivation, or informing the subject.

Current Approaches

Media archaeology has been popularized primarily through the work of Erkki Huhtamo and Jussi Parikka's edited collection, *Media Archaeology: Approaches, Applications, and Implications.*[53] However, media genealogy has been significantly underdeveloped in comparison. In this section, I explore several areas of scholarship that may have resonance with such an approach.

In a 2016 interview between Simon Ganahl and Erkki Huhtamo, published in *Le foucaldien*, Ganahl suggests that Huhtamo's work on identifying topoi and tracing their trajectories to the present is actually a form genealogical work rather than archaeological.[54] Huhtamo agrees, saying that, "genealogy is maybe an adequate term for my approach though I don't regard topoi as patterns, as regular repetitions of ideas

[50] Spinoza, *Ethics*.

[51] Foucault, *Government of Self and Others*.

[52] Foucault, Michel. 2011. *The Courage of Truth (The Government of Self and Others II): Lectures at the Collège de France, 1983-1984*. New York; Palgrave Macmillan: Picador.

[53] Huhtamo, Erkki, and Jussi Parikka, eds. *Media Archaeology: Approaches, Applications, and Implications*. Berkeley, Calif: University of California Press, 2011.

[54] Ganahl, S. 2016. From Media Archaeology to Media Genealogy: An Interview with Erkki Huhtamo. *Le foucaldien*, *2*(1), 9. DOI: http://doi.org/10.16995/lefou.17

practices."[55] The larger point Huhtamo makes is that he is skeptical of the totalistic view that is a part of a Foucauldian *episteme*.

Another recent work to take a genealogical approach to media is Grant Bollmer's 2016 book, *Inhuman Networks: Social Media and the Archaeology of Connection*.[56] In this work, Bollmer traces a deeper archaeological history of the concepts of networks and connection that pre-date contemporary computer-based conceptions. From a genealogical perspective, Bollmer also pays attention to the processes of subjectivation associated with these concepts of connection and networks, creating what he describes as inhuman citizens that are indistinguishable from other forms of technology which are also part of the network.

A major early push for a practice of media genealogy stems from the 2015 Communication, Rhetoric, and Digital Media Symposium at North Carolina State University, titled "Media, Epistemology, Power." One outcome from this symposium was a special collection of interviews published in the *International Journal of Communication* in early 2016. In writing the introduction to the collection of interviews, Jeremy Packer and Alexander Monea highlight that most of the scholars featured are not positioned in communications or media departments and would probably not identify their work as media genealogy, but none the less, their work resonates with some of the methods that would make up genealogical practices.[57] The six interviews that make up the collection focus on historical assemblages of technology, epistemology, and power. For example, Mark Andrejevic's work has examined the underlying political power structures of reality television, and, more recently, big data. In his interview, he argues that, "if you want to change society, you have to change it at the level of politics and the social and power relations. To fetishize technology and imagine that it somehow exists in ways that are independent of that, and can therefore affect a political change without an actual political process, just seems flawed to me."[58] The majority of the interviews in this collection highlight the genealogical work that elucidates the larger politics and social and power relations of a particular technological tool or apparatus, ranging through a variety of disciplines.

Notably, Peter Galison's work with Lorraine Datson also introduces an exploration of the processes of subjectivation related to forms of scientific

[55] Ibid.

[56] Bollmer, Grant. 2016. *Inhuman Networks: Social Media and the Archaeology of Connection*. New York: Bloomsbury Academic.

[57] Monea and Packer, "Media Genealogy and the Politics of Archaeology."

[58] Sylvia IV, J.J., and Mark Andrejevic. 2016. "The Future of Critique: Mark Andrejevic on Power/Knowledge and the Big Data-Driven Decline of Symbolic Efficiency." *International Journal of Communication* 10 (1): 3230–40.

observation. [59] This connection between the development of objectivity in terms of the scientific self and the development of technological tools is at the forefront of much of Galison's work.[60] This emphasis links Galison's work closely with Foucauldian notion of processes of subjectivation as they relate to technology. In its whole, this special collection offers a strong starting point for understanding what media genealogy might look like as a practice. However, I argue that it is possible to begin the development of a more robust methodological framework which can be used to extend media genealogical practices into further areas of exploration.

Beyond Foucault: The Machinic Regime

In order to develop methodological tools for practicing media genealogy, it is worth moving beyond Foucault's work. The ontological underpinnings of Gilles Deleuze and Félix Guattari's concept of assemblage, or *agencement*, offers a path for more clearly tracing the ways that processes of subjectivation are intertwined with larger social and political apparatuses. In addition, Guattari's interdisciplinary work and insistence on the importance of art adds the possibility of actively intervening in processes of subjectivation in order to effect change. This roadmap for intervening in order to effect change is often left out of the more historically focused work of other scholars.

By better understanding the role of in-formation in the process of *agencement*, one can more clearly follow continual and pervasive interactions. Tracing these movements provides more opportunities for understanding how to experiment with this process and its related process of subjectivation. Such experimentation involves risk precisely because we do not know ahead of time what a body can do. Spinoza argues that we may create new resonances that are favorable and extend and expand our abilities, but we may equally create experiments that are unfavorable and make it harder for us to act.[61] When one is able to understand these processes of formation, they are better prepared to grasp and intervene in a critical moment with a new experimentation that can generate new lines of flight and processes of subjectivation. As explored in detail below, it is the postsignifying aesthetic paradigm of the artmachine that is best suited to the process of invention that generates these lines of flight. This follows Guattari's call to embrace aesthetic regimes for their attempt to

[59] Daston, Lorraine, and Peter Galison. *Objectivity*. Paperback ed. New York, NY: Zone Books, 2010.
[60] Packer, Jeremy, and Peter Galison. 2016. "Abstract Materialism: Peter Galison Discusses Foucault, Kittler, and the History of Science and Technology." *International Journal of Communication* 10 (1): 3160-73.
[61] Spinoza, *Ethics*.

experiment by looking forward.[62] Further, postsignifying enunciation is the primary field through which art can battle empire, drawing upon concepts such as contagion and pathic transference.[63] Finally, it is technics, as elaborated by Guattari, that determines the problematic field for invention, which links closely to Foucault's conceptualization of technique/techne/technology and an insistence of media specificity.

To draw these various elements together and understand the importance of technics to postsignifying aesthetics and its role in the machinic regime, one must begin by understanding what the machine is and how it operates. For Guattari, machines are not technical entities, but rather the conceptual operators of assemblages that, "define the conditions of possibility of technical works… explaining how cultures modulate the biological, the sociopolitical and the material in their assemblages."[64] Guattari explores the components of the machine most thoroughly in *Chaosmosis*, outlining six main components that concern individuation and processes of subjectivation:

- Material and energy components;
- Semiotic, diagrammatic and algorithmic components (plans, formulae, equations and calculations which lead to the fabrication of the machine);
- Components of organs, influx and humours of the human body;
- Individual and collective mental representations and information;
- Investments of desiring machines producing a subjectivity adjacent to these components;
- Abstract machines installing themselves transversally to the machine levels previously considered (material, cognitive, affective and social).[65]

Let us consider each of these in turn, exploring how they might fit in with the broader genealogical method that has been developed.

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[62] Guattari, Félix. 2008. *The Three Ecologies*. Continuum Impacts. London: Continuum.
[63] Guattari, Félix. 2015. *Machinic Eros: Writings on Japan*. 1st edition. Minneapolis, MN: Univocal Pub.
[64] Sauvagnargues, *Artmachines,* 186.
[65] Guattari, Félix. 2006. *Chaosmosis: An Ethico-Aesthetic Paradigm*. Translated by Paul Bains and Julian Pefanis. Sydney: Power Publications. 34-35, formatting corrected.

Though the machine and its processes of *agencement* can seem abstract, Guattari is clear that the process is always material in nature. The second component adds semiotics to the machine in a way that closely aligns with N. Katherine Hayles' conception of the cognitive nonconscious, allowing for thought that is beyond the conscious, human, or mental approaches to knowing.[66] This collective assemblage of enunciation is larger than the cognition of an individual, extending across various levels of assemblages and encompassing the postsignifying regime. It is through the third component that the first two come to reside in a particular metastable individual, which might be a (post)human, computer, network, or some other assemblage, understood as a body without organs and its sets of electrical, affective, and chemical flows at various speeds.[67] The human body can be part of this assemblage, but is not necessarily so. These three components of the machine are responsible for the process of individuation, connecting to produce heterogeneity.[68]

The final three components of the machine relate to processes of subjectivation. The individual and collective mental representations of the fourth component refers to the "semiotic layers of mass-mediatised information, of the industry of social and commercial order words... which must not be confused with the structure of spoken language (French or English, for example), or with a technical, formal or scholarly language."[69] These semiotic layers are part of the larger collective assemblage of enunciation, created through the multiple and often contradictory discourses that influence the way we perceive the world. The discourse networks in which we are involved shape and may limit the way we interpret and understand the sensory information that shapes our perceptions of the world. In context of David Hume's philosophy, we can understand the creation of the subject as "an imprint, or an impression, left by principles, that it progressively turns into a machine capable of using this impression."[70] But the sense impressions and the machine both exist within already articulated discourse networks that thus constrain the construction of the machine.

Sauvagnargues explains that it is through the fifth component, the investments of desiring machines, that particular bodies are both subjectivated by but

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[66] See Sauvagnargues, *Artmachines* and Hayles, N. Katherine. 2016. "The Cognitive Nonconscious: Enlarging the Mind of the Humanities." *Critical Inquiry* 42 (Summer).

[67] Deleuze, Gilles, and Félix Guattari. 1972. *Anti-Oedipus: Capitalism and Schizophrenia*. Penguin Classics. New York, NY: Penguin Books.

[68] Sauvagnargues, *Artmachines.*

[69] Ibid. 190

[70] Deleuze, Gilles. 1991. *Empiricism and Subjectivity: An Essay on Hume's Theory of Human Nature*. Translated by Constantin V. Boundas. European Perspectives. New York: Columbia Univ. Press. 113.

also feed into a social machine that consists of coded flows.[71] Importantly for Guattari, subjectivity is created adjacent to the components themselves, creating a complex relationship. Desiring machines produce a subjectivity that is adjacent to the components, but the resulting subjectivity is *also* the condition of desiring machines rather than the causal sum of them. Such a formulation means that there is a dynamic relationship between subjectivity and desiring machines, leaving open the possibility for experimentation and change. Experimentations with one's processes of subjectivation can thus also alter one's desiring machines. In other words, the choice that arises out of multiple forms of nonconscious cognition can and do transform subjectivity, at all scales of the assemblage from that of the individual to society at large. Finally, it is the abstract machine that is a diagram of the assemblage and holds together the previous five components of the machine. It is "an intensive map of relations of force that assemble… humans and materials, techniques and institutions."[72] It is through this diagrammatic approach that experiments with processes of subjectivation are possible: "The abstract machine operates at whatever fractal level you want and enables you—as a variable in your possibilities of analysis, of your capacities to invest reality – to produce new modes of subjectivity."[73] Understanding the machine in this way makes clear the uncertain and always metastable state of the assemblages which surround us and also create us. For this reason, the aesthetic emphasis on experimentation is of utmost importance for generating new processes of subjectivation. Knowing the components of the machine and its diagrammatic approach to assemblage affords greater opportunity for intervention and experimentation with our own processes of subjectivation.

Artmachines

To summarize up to this point, it is the conceptual work of Foucault that provides the genealogical tools for creating the diagram, or as Deleuze and Guattari call it, the abstract machine that shows "the relations between forces which constitute power."[74] Constructing this diagram is a necessary first step before one can proceed to intervening in it, because being able to understand the diagram allows one to more clearly see where there are opportunities to intervene and create new lines of flight. However, Foucault himself primarily used his diagram only as a way to study past epochs, rather than to generate experimental processes in the present. Although he

[71] Sauvagnargues, *Artmachines.*
[72] Ibid. 202.
[73] Ibid. 193.
[74] Deleuze. *Foucault*, 36.

pointed to the Cynics as an example of experimentation in the past, little was offered in his oeuvre related to thinking about one's own contemporary position and processes of subjectivation. Therefore, we must add the concept of the artmachine to the Foucauldian diagram.

It is the artmachine that facilitates experimentation of and through the technics with which we are part of an assemblage. Sauvagnargues defines the artmachine through its construction of an understanding of the image and the sign as real production rather than interpretation and language.[75] Understood this way, art is intimately connected with semiotics due to its linkage with postsignifying signs. Production occurs as a becoming and thought is produced by an encounter with the sign: "Something in the world forces us to think. This something is an object not of recognition, but of a fundamental *encounter*."[76] The sign that is encountered is also the bearer of the problem – it is the relation between thought and the sensible. The movement-image, as well as all other signs are "the modulation of the object itself."[77] This concept of modulation relates to Simondon's rejection of Aristotelian hylomorphism. Rejecting the hylomorhpic imposition of form, information facilitates a continuous exchange between two metastable entities, drawing them into a common system or associated milieu. In this way, art inscribes the production of its sense into the material. It functions as a sign that is the bearer of a problem. How does this work?

Aristotle offered an example of the brick and its mold to explain his relationship between matter and form.[78] In this view, the mold impresses its form upon the matter (clay) to create the brick. Simondon argues that there is actually a reciprocal assumption of form occurring between the clay and the mold:

> Each molecule of the clay enters into communication with the pressure exercised by the surface of the mould, in constant communication with the geometric form concretised in the mould; the mould is as informed by the clay as the clay is by the mould, having to resist, to a certain point, the deformations of the material (the constraints it exercises on the mould). What this very simple, canonical example shows... is that at the level of technics itself, where the hylomorphic scheme appears to be triumphant, the individuation (of the brick) puts into play a ... differentiation that operates in such

[75] Ibid.
[76] Deleuze, Gilles. 1994. *Difference and Repetition*. New York: Columbia University Press. 139.
[77] Deleuze, Gilles. 1989. *Cinema 2: The Time Image*. Minneapolis: University of Minnesota. 27
[78] Sauvagnargues, *Artmachines*.

> a way that the mould and the clay 'modulate' together, concretely interacting.[79]

From this example, one can see the importance of modulation to Deleuze's conception of the movement-image as modulation of the object itself.[80] The encounter between thought and the work of art creates a sign that is modulated through problematic disparation: "In other words, art does not consist in imposing form upon matter, nor in producing a subjective effect upon sense, but in 'following a flow matter.'"[81] Art is instead about capturing forces.[82] Conceived thus, art becomes indistinguishable from technics – both are forms of modulation in which "materials are captured and assembled into matter of expression."[83] It is the artmachine, then, that facilitates experimentation.

This suggests both a new methodology for communication studies and an approach to experimenting with new forms of subjectivity by exploring the various modulations that arise from different assemblages of technics. We can understand this process by returning to Guattari's final component of the machine – the abstract machine – and its capture of forces through a double becoming in the process of modulation, which is the creative process. Or, we might say, it is the affirmative process of construction through disparation. Gilbert Simodon, an influential source for Deleuze's writing, draws his inspiration for disparation from the psychophysiology of perception which "designates the production of depth in binocular vision and addresses the asymmetry of retinal images, an irreducible disparity that problematically produces, through the resolution of their differences, binocular vision."[84] Disparation is creative in that it resolves the problematic of bi-dimensional images through the construction of a new tri-dimensionality of depth. Such is the affirmative and creative element of modulation.

Conclusions and Future Directions

This article has examined how Foucault's genealogical methods can be seen to grow out of his earlier archaeological methods. The historical nature of media genealogy

[79] Ibid. 70.
[80] Deleuze, *Cinema 2: The Time Image*.
[81] Sauvagnargues. *Artmachines.* 71.
[82] Deleuze, Gilles. 2003. *Francis Bacon: The Logic of Sensation*. Translated by Daniel W Smith. Minneapolis: University of Minnesota Press.
[83] Sauvagnargues, *Artmachines.* 75.
[84] Ibid. 63.

can cut across a variety of disciplines as it explores the larger political and social context of technological tools and media. In particular, this approach adds politics and processes of subjectivation to media archaeology. By adding processes of subjectivation to the analysis, a method can be developed for exploring the *agencement*, or assemblage of social and technical elements that make up a particular technology and shape those who use it, as well as the continued development of further technology. By drawing on the work of Deleuze, Guattari, and Sauvagnargues, this essay argues that critical and creative practices can be combined in the form of artmachines that allow for experimentation with new assemblages and intervene with experimental processes of subjectivation.

Although this article traces the theoretical underpinnings of this method, one questions that remains is how this theory would look put into practice. While more work, such as that by Bollmer, Galison, and Datson referenced above, has begun to focus on specific media and their associated processes of subjectivation, there is very little work that has attempted to then intervene in those processes. For example, Bollmer's *Inhuman Networks* ends by suggesting that we must find non-networked ways of relating to one another, but does not go on to make suggestions or intervene in the processes of subjectivation explored in the work.[85] Yet, this should not be interpreted as a shortcoming of such work, either. Writing such as this makes clearer the diagram, or abstract machine, to which these or other authors might later turn in order to create such interventions. Active interventions are traditionally largely outside the scope of much academic work, especially in the realms of the humanities and social sciences, where the emphasis is instead on theory, critique, and qualitative and quantitative analysis.

The full method proposed herein would extend the burgeoning practices of media archaeology and genealogy by actually creating an artmachine. In the example provided by Bollmer above, this would entail not only developing ideas for how to relate to one another in non-networked ways, but putting those into practice and reflecting on their impact on the processes of subjectivation. Do they, for example, begin to make a shift away from the inhuman citizens created by contemporary social media practices? While there are no precise guidelines for how to implement such a creative practice, there is other work that offers resonances and practices that might work well with exploring processes of subjectivation.

Critical making offers one strong possibility for such resonances. Matt Ratto, in developing both this concept and method, aimed to bring together two types of work that have recently been understood as quite separate: "critical making is an

[85] Bollmer, *Inhuman Networks*. 232.

elision of two typically disconnected modes of engagement with the world - 'critical thinking' often considered as abstract, explicit, linguistically based, internal and cognitively individualistic; and 'making,' typically understood as material, tacit, embodied, external and community oriented."[86] In further explaining this separation, Ratto notes that critical thinking is almost always understood linguistically, while making often tends to be interpreted as a form of rule-following such as putting together a piece of IKEA furniture.[87] Therefore, juxtaposing these terms creates some cognitive dissonance. This method emphasizes non-linguistic a-signifying approaches to scholarship because it allows for a process of making that avoids the over coding of the linguistic strata. This is a material and embodied approach with an emphasis on creativity.

The materiality of making also serves an important role for Ratto in this process: "My goal is to make concepts more apprehensible, to bring them in ways to the body, not only the brain, and to leverage student and researchers' personal experiences to make new connections between the lived space of the body and the conceptual space of scholarly knowledge."[88] This material emphasis also demonstrates clearly what Deleuze meant when he linked true critique with true creation. Ratto sees a similar connection: "One insight I have had is that the practices and modes of engagement that are typically called 'critical' and those that are equated with creativity and innovation are quite similar."[89] When making is the approach one takes to critique, it can be nothing else but creation. Such an approach offers an important shift in a landscape where social scientists most often critique and analyze without being involved in the process of creation.

In conclusion, the methods proposed in this article build upon the media archeology work that has been underway in the field of media studies and adds to it not only the emphasis on politics and processes of subjectivation, but also a call for an active an artistic intervention in the processes of subjectivation that have been diagrammed through this work. Critical making offers one possibility for such interventions. Importantly, this method is intended as a way to extend and continue previous archaeological and genealogical work rather than critique or replace it. By

[86] Ratto, Matt, and S. Hockema. 2009. "FLWR PWR: Tending the Walled Garden." In *Walled Garden*, edited by Annet Dekker, 51–60. E-Culture 1. Amsterdam: Virtueel Platform.

[87] Ratto, Matt, and Garnet Hertz. 2015. "Defining Critical Making: Matt Ratto in Conversation with Garnet Hertz." In *Conversations in Critical Making*, edited by Garnet Hertz, 32–52. Blueshift Theories. CTheory Books.

[88] Ratto, Matt. 2011. "Critical Making: Conceptual and Material Studies in Technology and Social Life." *The Information Society* 27, no. 4 (July): 252–60. https://doi.org/10.1080/01972243.2011.583819. 254.

[89] Ibid. 259.

drawing on past diagrammatic work one is better positioned to implement a Spinozan ethics of experimentation within media and technology studies.

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